



58049-00035.ST25.txt
SEQUENCE LISTING

<110> Korea Research Institute of Bioscience and Biotechnology
KWAK, Sang-Soo
KWON, Suk-Yoon
LEE, Haeng-Soon
RYU, Sun-Hwa

<120> Multiple stress-inducible peroxidase promoter derived from
Ipomoea batatas

<130> 58049-00035

<140> US 10/597,945
2006-08-11

<150> PCT/KR2004/000381
2004-02-24

<160> 30

<170> KopatentIn 1.71

<210> 1
<211> 1512
<212> DNA
<213> Ipomoea batatas

<400> 1
atggcttcct ttgtcactcg gctcagcctg gcccttagct tcatcgccct agccctagct 60
ggcttctcca ttaccagaa tacccataca gccatgaaag ggcagcttaa gctcacccca 120
aagtggctgc tagacaacac tctagagtcg tcagtggccg acgtgctctc actacgccta 180
ggcatctcct ccggcaagct ttccgacgaa gactgcatat tctccgccgt taaggaagtg 240
gtggacgccg ccattgatgc agaaacccgc atgggtgctt ccctcattcg cctcttcttc 300
catgactgct ttgttgatgt acgtacgcta attttgtacg atgatgtttt tttttttttt 360
tttttttttc ccactgcatt atattaggaa attaaacaga ttgaaatgtg tgttattaat 420
gtattatctg cagggttgtg acgcaggtct tctactaaac gatacaccta ctttcaccgg 480
agaacagacc gccggcggca ataataactc agtcagaggt tttgaggtga tacaacaagc 540
taaagagaat gtgataacca aatgtcccta catacaagta tcttgtgccg acatcttatc 600
cattgctgcc cgtgattctt tccagagagt aagtccattt atttctaaag gttgaaatta 660
ataagaacaa gaatccaaac aaataacaga cagtaaaaaa aaaagattta tgtggtttga 720
caatatgttg aaattgtttt tatatttaat gactagtatt tatgcattat atttatatgc 780
aactctaaac atgcagttta ctggagaaac gtacaccgtg actctgggaa gactcgatgc 840
aagaacggcg aaccttaccg gagctaacac ccaactcgtc ggaccaaacg aggaattggc 900
atcgcaagtc gagaaatttg cggcgaaagg gttctccgaa acggagctag tcgccttggt 960
aggtgttcac acggttgggt tttcgagatg tccgctttta tgcgttccca ttttcatcaa 1020
tcccgcccg gcctccacgc tgcaatgcaa ctgtccgggtg agtcccgcgc acaccgggct 1080

58049-00035.ST25.txt

ggatgggcctg gacccccactc cgttgacgtg ggaccaaagt ttttactccg acgtggctaa 1140
 cggacaaggg cttctgttct ccgacaacga gctgatgaat agcaacacca ccagcgccgc 1200
 cgtaggagg tacagggacg agatggacgc ttttctcgcc gatttcgccg ccgccatggt 1260
 gaagatgagc ctctgcccgc cgtcccccg agtggagctc gaaatccgag aggtttgcag 1320
 cgaggtgaat gccaacacag ttgcatccat gtgaagtctg ttcccatcga catcaataac 1380
 gtctgtgatt ctgtgaaagt tttactcgga ctgtgaagaa ttttcacttt ctgttgtttc 1440
 tgaaataaaa aagatTTTTT ttttatgtcc taacaaaact tgtattactg aataaaattt 1500
 ataaatttgt ta
 1512

<210> 2
 <211> 110
 <212> DNA
 <213> Ipomoea batatas
 <220>
 <221> promoter
 <222> (1)..(110)
 <223> -110 deletion promoter

<400> 2
 tttccctttc aagttctcta tttaaggaag cctgagaagc cattaatcct catcatcagc 60
 tcgaccactc atttcttctt catacttcct ttgctgtgat aatcatcatc 110

<210> 3
 <211> 177
 <212> DNA
 <213> Ipomoea batatas
 <220>
 <221> promoter
 <222> (1)..(177)
 <223> -177 deletion promoter

<400> 3
 aaattaaatc tcagtttgct ttattatatt attatcaaca ataataattt aatactgac 60
 gaagaacttt ccctttcaag ttctctattt aaggaagcct gagaagccat taatcctcat 120
 catcagctcg accactcatt tcttcttcat acttcctttg ctgtgataat catcatc 177

<210> 4
 <211> 306
 <212> DNA
 <213> Ipomoea batatas
 <220>
 <221> promoter
 <222> (1)..(306)

<223> -306 deletion promoter

<400> 4
 taagggtgttt tatcgtggca gcatgagtgc atgacaaacg catatattat tattaaaaca 60
 aaatagtact ccaatcataa taaattatct tatattatat tgccaacaat taaaaattca 120
 aattagaaca aattaaatct cagtttgctt tattatatta ttatcaacaa taataattta 180
 atactgatcg aagaactttc cttttcaagt tctctattta aggaagcctg agaagccatt 240
 aatcctcatc atcagctcga ccactcattt cttcttcata cttcctttgc tgtgataatc 300
 atcatc
 306

<210> 5
 <211> 366
 <212> DNA
 <213> Ipomoea batatas

<220>
 <221> promoter
 <222> (1)..(366)
 <223> -366 deletion promoter

<400> 5
 tagtataatg aaataaagtt aatcattctc tatatttgat gatggtaatt agtatcatgg 60
 taagggtgttt tatcgtggca gcatgagtgc atgacaaacg catatattat tattaaaaca 120
 aaatagtact ccaatcataa taaattatct tatattatat tgccaacaat taaaaattca 180
 aattagaaca aattaaatct cagtttgctt tattatatta ttatcaacaa taataattta 240
 atactgatcg aagaactttc cttttcaagt tctctattta aggaagcctg agaagccatt 300
 aatcctcatc atcagctcga ccactcattt cttcttcata cttcctttgc tgtgataatc 360
 atcatc
 366

<210> 6
 <211> 433
 <212> DNA
 <213> Ipomoea batatas

<220>
 <221> promoter
 <222> (1)..(433)
 <223> -433 deletion promoter

<400> 6
 atgggtgactt aaagggctga atccaacata tattctgaca tttaaaaatg ctaacgtacg 60
 gttagattag tataatgaaa taaagttaat cattctctat atttgatgat ggtaattagt 120
 atcatggtaa ggtgttttat cgtggcagca tgagtgcacg acaaacgcat atattattat 180

58049-00035.ST25.txt

taaaacaaaa tagtactcca atcataataa attatcttat attatattgc caacaattaa 240
aaattcaaat tagaacaaat taaatctcag ttgctttat tatattatta tcaacaataa 300
taatttaata ctgatcgaag aactttccct ttcaagttct ctatttaagg aagcctgaga 360
agccattaat cctcatcatc agctcgacca ctcatttctt cttcatactt cctttgctgt 420
gataatcatc atc
433

<210> 7
<211> 818
<212> DNA
<213> Ipomoea batatas
<220>
<221> promoter
<222> (1)..(818)
<223> -818 deletion promoter

<400> 7
gcttcacgca ctcaactagt cacatctttc caggcaaaat ttacttttct atgaatatga 60
gaagttccat ctatggaaat aacggattat ttatctaatt ttcaaattct atatatatag 120
tctcgagtgg aacaaaaata gaactaattt gaacaaatca aagtctaaga aaataataca 180
tgcttttagca gcaaaaataa gaatggtact atacttaatc ctcatcatag tcttcaaccc 240
tgcatatagc aactttaaca ttttatattc aaatatactt taatttagtc atgataatac 300
aactcaccta ctccattata gccgataata caactcacct agctactcca ttatagtcca 360
acaatatcaa atgaataaaa tagtaatggg gacttaaagg gctgaatcca acatatattc 420
tgacatttaa aaatgctaac gtacggttag attagtataa tgaaataaag ttaatcattc 480
tctatatttg atgatggtaa ttagtatcat ggtaagggtg tttatcgtgg cagcatgagt 540
gcatgacaaa cgcatatatt attattaaaa caaaatagta ctccaatcat aataaattat 600
cttatattat attgccaaca attaaaaatt caaattagaa caaattaaat ctcagtttgc 660
tttattatat tattatcaac aataataatt taatactgat cgaagaactt tccctttcaa 720
gttctctatt taaggaagcc tgagaagcca ttaatcctca tcatcagctc gaccactcat 780
ttcttcttca tacttccttt gctgtgataa tcatcatc
818

<210> 8
<211> 1199
<212> DNA
<213> Ipomoea batatas
<220>
<221> promoter
<222> (1)..(1199)

<223> -1199 deletion promoter

```

<400>      8
atgcaggggtg aaagtaagat tgaatatact gatactacaa ttaactaatg ataaagtata    60
acttttgtaa aaaatttgat tttttttttt gatgaattca tatactccaa agatttttcct   120
catttaatta aatttctatc ctcatgttga acccattaat cgaataattg acatattaga    180
taaacttagc catcatatga catttgatca tgattgatga tttttaaaaa ataaaaacaa    240
aattatgaaa gggtaatgaa atatttttaa aaaattatgt aaaccctgta atctagtaat    300
ctgtacaata ataattttgt ttcaactaag aggatgttgg caaaagtata attaaacttg    360
tgatcttcgt acaataatta tgcttcacgc actcaactag tcacatcttt ccaggcaaaa    420
tttacttttc tatgaatatg agaagttcca tctatggaaa taacggatta tttatctaatt   480
tttcaaattc tatatatata gtctcgagtg gaacaaaaat agaactaatt tgaacaaatc    540
aaagtctaag aaaataatac atgcttttagc agcaaaaaata agaatggtag tatacttaat    600
cctcatcata gtcttcaacc ctgcatatag cacacttaac attttatatt caaatatact    660
ttaatttagt catgataata caactcacct actccattat agccgataat acaactcacc    720
tagctactcc attatagtcc aacaatatca aatgaataaa atagtaatgg tgacttaaag    780
ggctgaatcc aacatatatt ctgacattta aaaatgctaa cgtacgggta gattagtata    840
atgaaataaa gttaatcatt ctctatattt gatgatggta attagtatca tggtaagggtg   900
ttttatcgtg gcagcatgag tgcatgacaa acgcatatat tattattaaa acaaaatagt    960
actccaatca taataaatta tcttatatta tattgccaac aattaaaaat tcaaattaga  1020
acaaattaaa tctcagtttg ctttattata ttattatcaa caataataat ttaatactga  1080
tcgaagaact ttccctttca agttctctat ttaaggaagc ctgagaagcc attaatcctc  1140
atcatcagct cgaccactca tttcttcttc atacttcctt tgctgtgata atcatcatc   1199

```

```

<210>      9
<211>      1467
<212>      DNA
<213>      Ipomoea batatas

```

```

<220>
<221>      promoter
<222>      (1)..(1467)
<223>      -1467 deletion promoter

```

```

<400>      9
ggctgtccgg aattctgtct ctctggacca gttttggcaa acaattttga aaccacactt    60
atactactcc aaaaattatg aaatttttat ggtagcttct acacttatag aactacatgt   120
ataaaaaata ttgggtcaaa ataccttacc gatttttccc aaatattcac ggaacttact   180

```

58049-00035.ST25.txt

gccagaatct accctgcttt ttcctttcac tattttcaca actataagca tatatgggca 240
 taaatatgac atgaacatgc atgaaccaat gcagggtgaa agtaagattg aatatactga 300
 tactacaatt aactaatgat aaagtataac ttttgtaaaa aatttgattt ttttttttga 360
 tgaattcata tactccaaag attttcctca ttttaattaaa tttctatcct catgttgaac 420
 ccattaatcg aataattgac atattagata aacttagcca tcatatgaca tttgatcatg 480
 attgatgatt tttaaaaaat aaaaacaaaa ttatgaaagg gtaatgaaat attttaaaaa 540
 aattatgtaa accctgtaat ctagtaatct gtacaataat aattttgttt caactaagag 600
 gatgttgga aaagtataat taaacttggtg atcttcgtac aataattatg cttcacgcac 660
 tcaactagtc acatctttcc aggcaaaatt tacttttcta tgaatatgag aagttccatc 720
 tatggaaata acggattatt tatctaattt tcaaattcta tatatatagt ctcgagtgga 780
 acaaaaatag aactaatttg aacaaatcaa agtctaagaa aataatacat gcttttagcag 840
 caaaaataag aatggtacta tacttaatcc tcatcatagt cttcaaccct gcatatagca 900
 cacttaacat tttatattca aatatacttt aatttagtca tgataataca actcacctac 960
 tccattatag ccgataatac aactcaccta gctactccat tatagtccaa caatatcaaa 1020
 tgaataaaat agtaatggtg acttaaaggg ctgaatccaa catatattct gacattttaa 1080
 aatgctaacg tacgggttaga ttagtataat gaaataaagt taatcattct ctatatttga 1140
 tgatggtaat tagtatcatg gtaagggtgtt ttatcgtggc agcatgagtg catgacaaac 1200
 gcatatatta ttattaaaac aaaatagtagc tccaatcata ataaattatc ttatattata 1260
 ttgccaaaca ttaaaaattc aaattagaac aaattaaatc tcagtttgct ttattatatt 1320
 attatcaaca ataataattt aatactgac gaagaacttt ccctttcaag ttctctattt 1380
 aaggaagcct gagaagccat taatcctcat catcagctcg accactcatt tcttcttcat 1440
 acttcctttg ctgtgataat catcatc
 1467

<210> 10
 <211> 1934
 <212> DNA
 <213> Ipomoea batatas

<220>
 <221> promoter
 <222> (1)..(1934)
 <223> -1934 deletion promoter

<400> 10
 ttgccatctc accacttcgt cttaaacaat ctaggatatt cttagatatt cttcatactc 60
 aagtctcaca cttgaaatca atcaagactc ttactactaac aattcctcaa tatacctcat 120
 aatatcatct ctacttaaac tagagagatt tccaactctc aattaatcac caaaggtaac 180

58049-00035.ST25.txt

tctccaaata tccaaatgga aggtttcaac ttccaaacta ataccaaacc aaccggacta 240
atcataatca tattcataat cataaattgt ttctaactgc ccctgtccag aaattacagt 300
tttgcgagc ccgaaagatt gagccggtaa caatagttcc cgaactcttt ttcacttgaa 360
atTTTTatgg tagaacccta acttatagta cttgatatcc ataaaaagtt ttggtcacct 420
aggttcacga attaacacag aaaattacat ctttgccctt ggagtgggc tgtccggaat 480
tctgtctctc tggaccagtt ttggcaaaca attttgaaac cacacttata ctactccaaa 540
aattatgaaa tttttatggt agcttctaca cttatagaac tacatgtata aaaaatattg 600
ggTcaaaata ccttaccgat ttttcccaa tattcacgga acttactgcc agaactacc 660
ctgctttttc ctttactat tttcacaact ataagcatat atgggcataa atatgacatg 720
aacatgcatg aaccaatgca gggTgaaagt aagattgaat atactgatac tacaattaac 780
taatgataaa gtataacttt tgtaaaaaat ttgatttttt tttttgatga attcatatac 840
tccaaagatt ttctcattt aattaaattt ctatcctcat gttgaacca ttaatcgaat 900
aattgacata ttagataaac ttagccatca tatgacattt gatcatgatt gatgattttt 960
aaaaaataaa aacaaaatta tgaaagggtA atgaaatatt ttaaaaaaat tatgtaaacc 1020
ctgtaatcta gtaatctgta caataataat tttgtttcaa ctaaggaggat gttggcaaaa 1080
gtataattaa acttgatgatc ttcgtacaat aattatgctt cacgcactca actagtcaca 1140
tctttccagg caaaatttac ttttctatga atatgagaag ttccatctat ggaaataacg 1200
gattatttat ctaattttca aattctatat atatagtctc gagtggaaaca aaaatagaac 1260
taatttgaac aaatcaaagt ctaagaaaat aatacatgct ttagcagcaa aaataagaat 1320
ggtactatac ttaatcctca tcatagtctt caaccctgca tatagcacac ttaacatttt 1380
atattcaaat atactttaat ttagtcatga taatacaact cacctactcc attatagccg 1440
ataatacaac tcacctagct actccattat agtccaacaa tatcaaatga ataaaatagt 1500
aatggtgact taaagggtg aatccaacat atattctgac atttaaaaaat gctaacgtac 1560
ggtagatta gtataatgaa ataaagttaa tcattctcta tatttgatga tggtaattag 1620
tatcatggta aggtgtttta tcgtggcagc atgagtgcac gacaaacgca tatattatta 1680
ttaaaacaaa atagtactcc aatcataata aattatctta tattatattg ccaacaatta 1740
aaaattcaaa ttagaacaaa ttaaattctca gtttgcttta ttatattatt atcaacaata 1800
ataatttaat actgatcgaa gaactttccc tttcaagttc tctatttaag gaagcctgag 1860
aagccattaa tcctcatcat cagctcgacc actcatttct tcttcatact tcctttgctg 1920
tgataatcat catc

1934

58049-00035.ST25.txt

<210> 11
 <211> 2433
 <212> DNA
 <213> Ipomoea batatas

<220>
 <221> promoter
 <222> (1)..(2433)
 <223> -2433 promoter

<400> 11
 cctcatggag tattctcata actctcttca gtatgaatga atcatacaat acaacgcagc 60
 gacgaataga cttcgccctg aactagacat acgacaacat agccaccata cgggaaaggc 120
 acttcaagct ctttatcccg taggctgcaa caacataacg acataacgac cactgggcaa 180
 gggcatttac agccacccgt ggggtcaatca aggtcctcct cactcacttt agaaactaag 240
 ggtttgaaaa catgatcttt ccttcagttt ttcttacaac aaatcattca ctttggacac 300
 atttcacaat tgagtccaat acttaaaccg gctacttcat tagcccctga aggattttta 360
 aaaaaacttt cactgcccgc aggctcttca aacatctttt cctcattatc aagtgaggca 420
 ttttcctcaa aagtaagggt ttgacaacct ttatatcaaa atagcatacg tttttcaacg 480
 taagtttcat aacatttact tgccatctca ccacttcgtc ttaaacaatc taggatattc 540
 ttagatattc ttcatactca agtctcacac ttgaaatcaa tcaagactct tacactaaca 600
 attcctcaat atacctcata atatcatctc tacttaaact agagagattt ccaactctca 660
 attaatcacc aaaggtaact ctccaaatat ccaaattggaa ggtttcaact tccaaactaa 720
 taccaaacca accggactaa tcataatcat attcataatc ataaattggt tctaactgcc 780
 cctgtccaga aattacagtt ttgcgagtc cgaaagattg agccggtaac aatagttccc 840
 gaactctttt tcaactgaaa tttttatggt agaaccctaa cttatagtac ttgatattca 900
 taaaaagttt tggtcaccta ggttcacgaa ttaacacaga aaattacatc tttgcccttg 960
 gcagtgggct gtccggaatt ctgtctctct ggaccagttt tggcaaacaa ttttgaaacc 1020
 acacttatac tactccaaaa attatgaaat ttttatggta gcttctacac ttatagaact 1080
 acatgtataa aaaatatttg gtcaaaatac cttaccgatt tttcccaaatt attcacggaa 1140
 cttactgcca gaatctaccc tgctttttcc tttcactatt ttcacaacta taagcatata 1200
 tgggcataaa tatgacatga acatgcatga accaatgcag ggtgaaagta agattgaata 1260
 tactgatact acaattaact aatgataaag tataactttt gtaaaaaatt tgattttttt 1320
 ttttgatgaa ttcatatact ccaaagattt tcctcattta attaaatttc tatcctcatg 1380
 ttgaacccat taatcgaata attgacatat tagataaact tagccatcat atgacatttg 1440
 atcatgattg atgattttta aaaaataaaa acaaaattat gaaagggtaa tgaaatattt 1500
 taaaaaaatt atgtaaaccc tgtaatctag taatctgtac aataataatt ttgtttcaac 1560

58049-00035.ST25.txt

taagaggatg ttggcaaaag tataattaaa cttgtgatct tcgtacaata attatgcttc 1620
 acgcactcaa ctagtcacat ctttccaggc aaaatttact tttctatgaa tatgagaagt 1680
 tccatctatg gaaataacgg attattttatc taattttcaa attctatata tatagtctcg 1740
 agtggaaaca aaatagaact aatttgaaca aatcaaagtc taagaaaata atacatgctt 1800
 tagcagcaaa aataagaatg gtactatact taatcctcat catagtcttc aaccctgcat 1860
 atagcacact taacatttta tattcaaata tactttaatt tagtcatgat aatacaactc 1920
 acctactcca ttatagccga taatacaact cacctagcta ctccattata gtccaacaat 1980
 atcaaatgaa taaaatagta atgggtgactt aaagggctga atccaacata tattctgaca 2040
 tttaaaaatg ctaacgtacg gttagattag tataatgaaa taaagttaat cattctctat 2100
 atttgatgat ggtaattagt atcatggtaa ggtgttttat cgtggcagca tgagtgcag 2160
 acaaacgcat atattattat taaaacaaaa tagtactcca atcataataa attatcttat 2220
 attatattgc caacaattaa aaattcaaat tagaacaat taaatctcag ttgtctttat 2280
 tatattatta tcaacaataa taatttaata ctgatcgaag aactttccct ttcaagttct 2340
 ctatttaagg aagcctgaga agccattaat cctcatcatc agctcgacca ctcatcttct 2400
 cttcatactt cctttgctgt gataatcatc atc
 2433

<210> 12
 <211> 26
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> GSP1 promoter

<400> 12
 ctgagccgag tgacaaagga agccat
 26

<210> 13
 <211> 22
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> AP1 promoter

<400> 13
 gtaatacgac tcactatagg gc
 22

<210> 14
 <211> 25

<212> DNA
 <213> Artificial Sequence

<220>
 <223> GSP2 promoter

<400> 14
 cacagcaaag gaagtatgaa gaagc
 25

<210> 15
 <211> 19
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> AP2 promoter

<400> 15
 actatagggc acgcgtggt
 19

<210> 16
 <211> 26
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> exon promoter

<400> 16
 atggcttcct ttgtcactcg gctcag
 26

<210> 17
 <211> 30
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> intron promoter

<400> 17
 tcatacagctc gaccactcat ttcttcttca
 30

<210> 18
 <211> 35
 <212> DNA
 <213> Artificial Sequence

<220>
 <223> forward promoter for -2433 deletion promoter

<400> 18
gccaaagcttg gtcctcatgg agtattctca taact
35

<210> 19
<211> 33
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -1934 deletion promoter

<400> 19
gccaaagcttt tgccatctca ccacttcgtc tta
33

<210> 20
<211> 31
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -1467 deletion promoter

<400> 20
gccaaagcttg gctgtccgga attctgtctc t
31

<210> 21
<211> 33
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -1199 deletion promoter

<400> 21
gccaaagctta tgcagggtga aagtaagatt gaa
33

<210> 22
<211> 26
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -818 deletion promoter

<400> 22
gccaaagcttg cttcacgcac tcaact
26

<210> 23
<211> 33

<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -433 deletion promoter

<400> 23
gccaaagctta tggtagactta aagggtgaa tcc
33

<210> 24
<211> 34
<212> DNA
<213> Artificial Sequence

<220>
<223> reverse primer for -2433, 1934, 1467, 1199, 818, 433, 366, 306,
177 and 110 deletion promoter

<400> 24
tcctctagag atgatgatta tcacagcaaa ggaa
34

<210> 25
<211> 31
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -366 deletion promoter

<400> 25
ttcctgcaga tagtataatg aaataaagtt a
31

<210> 26
<211> 26
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -306 deletion promoter

<400> 26
tttctgcagt aagggtgttt atcgtg
26

<210> 27
<211> 25
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -177 deletion promoter

<400> 27
ttcctgcaga aattaaatct cagtt
25

<210> 28
<211> 24
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for -110 deletion promoter

<400> 28
ttcctgcagt ttccctttca agtt
24

<210> 29
<211> 19
<212> DNA
<213> Artificial Sequence

<220>
<223> forward primer for NPTII

<400> 29
gaggctattc ggctagatg
19

<210> 30
<211> 21
<212> DNA
<213> Artificial Sequence

<220>
<223> reverse primer for NPTII

<400> 30
atcgggagcg gcgataccgt a
21

1

1